Q. PLEASE IDENTIFY THE FIRST GUIDELINE SUGGESTED BY AT&T TO BE USED FOR DOCUMENTATION AND REVIEW OF COST STUDIES.

A. The first Guideline states:[6]

> "The work papers must clearly and logically present all data used in developing the cost estimates and provide a narrative explanation of all formulas and algorithms applied to the data. These work papers must allow others to replicate the methodology and calculate equivalent or alternative results using equivalent or alternative assumptions."

Q. DID THE HATFIELD STUDY DOCUMENTATION INCLUDE A PRESENTATION OF ALL DATA USED IN DEVELOPING THE COST ESTIMATES AND A NARRATIVE EXPLANATION OF ALL FORMULAS AND ALGORITHMS?

A. No. There is no study documentation or model documentation available.

Dr. Mercer's response, representing AT&T, to data request response 3.3 from U S WEST indicates that no documents describing the purpose and function of the Model exist; no documents describing the methods and procedures used in the Model exist; and Dr. Mercer's testimony is the sole source for Model assumptions. Dr. Mercer's testimony did not discuss either assumptions, inputs or calculation methodology for interoffice transport facilities, tandem switching or SS7 components.

Q. DID AT&T PROVIDE A LIST OF ALL DATA USED WITHIN THE STUDY WITH U S WEST'S INITIAL REQUEST FOR INFORMATION?

A. No. AT&T's initial response to U S WEST's request 2.1 did not identify all source documents for inputs as members of Dr. Mercer's organization later also identified reliance on additional *Statistics of Communications Common Carriers Report 2.5* as the source for access line demand. They also indicated that they relied on input from their client AT&T for key

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6 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-3.

input/assumption information to account for business lines and multi-line residences by density range[7]. Additionally supporting work papers for calculation of the 18 year life input were not made available[8].

Most concerning, however, is the inability of U S WEST to validate input data used by Dr. Mercer. Dr. Mercer states[9]:

> "We based our assumption on conversations that have taken place over at least the past one to two years with a variety of people who work, or at one time worked, for local exchange carriers who are involved in procurement and/or operation of DLC systems. We have held many similar conversations with persons employed by switch manufacturers, as well as others involved in the telecommunications industry. We have not recorded the details of these conversations, and, in any event, are often asked not to release names and companies involved."

It is impossible for anyone to verify the accuracy of Dr. Mercer's inputs without knowing the context of the discussion, the reliability of source and the basis for the person's estimates.

Q. PLEASE IDENTIFY THE SECOND GUIDELINE SUGGESTED BY AT&T TO BE USED FOR DOCUMENTATION AND REVIEW OF COST STUDIES.

A. The second Guideline states:[10]

> "The work papers must clearly set forth all significant assumptions and identify all source documents used in preparing the cost estimate."

Q. DID THE HATFIELD STUDY DOCUMENTATION INCLUDE A PRESENTATION OF ALL SIGNIFICANT ASSUMPTIONS AND

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7 Direct testimony of Dr. Mercer, March 14, 1996, page 7, lines 7-8 and information provided by Mr. Dick Chandler, representing Hatfield and Associates on March 14, 1996.

8 AT&Data T response to U S WEST data request 3.10.

9 AT&T response to U S WEST data request 3.15.

10 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-3.

SOURCE DOCUMENTS USED IN PREPARING THE COST ESTIMATE?

A. No. As stated previously, Dr. Mercer's testimony is the sole source for Model assumptions and Dr. Mercer's testimony did not discuss either assumptions or calculation methodology for interoffice transport, tandem switching or SS7 components. Also, as stated previously, AT&T's response to U S WEST's request 2.1 did not initially identify all source documents for inputs.

Of major concern, however, is that Dr. Mercer is not clear that key business to residence line ratio information is an "assumption", not based on analysis[11]. During the U S WEST review, Mr. Chandler, representing Hatfield Associates, Inc. acknowledged that the business line to residence line ratio was simply based on client (AT&T) input. Mr. Chandler acknowledged that they had been unable to find an analytical correlation suggesting that as residence access lines increase in a distribution area, business lines also increase.

This is a major Model flaw from an engineering perspective since generally zoning ordinances limit business locations in residential sub-divisions and neighborhoods and engineering parameters differ for business customers than for residential customers. Everything else constant, increased density generally causes a decrease in cost per unit. *Consequently, an arbitrary adding of business lines into residential sub-divisions will cause an arbitrary decrease in costs.* As Peter Copeland discussed in his rebuttal testimony, BCM model developers have already researched this issue and have not yet found an analytically sound solution. This inappropriate assumption is critical because it causes a significant distortion of the loop investment calculations.

Q. ARE THERE OTHER ASSUMPTIONS IN THE HATFIELD MODEL THAT APPEAR TO BE UNSUPPORTED?

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[11] Direct testimony of Dr. Mercer, page 7, lines 7-8 describes the modification to input data. However, Attachment 1B describes it as "Bus, 2nd res line assumptions".

A. Yes. Dr. Mercer, in his testimony[12], seems to indicate that a "static location" approach to calculating end-office switch investment was used. However, supporting material relied upon by Hatfield indicates that the original Hatfield switching model assumed relocation of switching systems.[13] To the extent the Hatfield Model assumed relocation of switches, it is a violation of Utah legislative requirements for TSLRIC.[14] Relocation of existing plant and equipment is expressly prohibited in the Telecommunications Reform Act, H.B. 364, Section (13) which states:

> "Total service long run incremental cost" means the forward-looking incremental cost to a telecommunications corporation caused by providing the entire quantity of a public telecommunications service, network function, or group of public telecommunications services or network functions by using forward-looking technology, reasonably available, ***without assuming relocation of existing plant and equipment***. The "long-run" means a period of time long enough so that cost estimates are based on the assumption that all inputs are variable." [emphasis added]

Based on U S WEST's limited review of the Model, we are unable to say with certainty whether the Hatfield Model assumed relocation of switching equipment or not.

Q. PLEASE IDENTIFY THE THIRD GUIDELINE SUGGESTED BY AT&T TO BE USED FOR DOCUMENTATION AND REVIEW OF COST STUDIES.

A. The third Guideline states:[15]

> "The workpapers must be organized so that a person unfamiliar with the study will be able to work with the initial investment, expense, and demand data relating to the final cost estimate. Every number used in developing the estimate must be clearly identified in the workpapers as to what it

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12 Direct testimony of Dr. Mercer, page 8, lines 12-20.

13 *The Cost of Basic Universal Service*, Prepared for MCI Communications Corporation, by Hatfield Associates, Inc., July 1994, page 14.

14 H. B. 364, Section 13.

15 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-3.

> represents. Further, the source should be clearly identifiable and readily available, if not included in the workpapers.

Q. DID THE HATFIELD STUDY DOCUMENTATION INCLUDE A READILY AVAILABLE SOURCE FOR ALL NUMBERS?

A. No. The lack of verifiable conversations with unidentified persons was already discussed in detail related to Guideline 1.

Additionally, U S WEST is still unsure as to what source of information was used in the Model for total Switched Access Lines. During the April 25, 1996 review, members of Hatfield Associates, Inc. indicated that they relied upon *Table 2.5-Access Lines by Type of Customer For Reporting Local Exchange Companies as of December 31, 1993, Statistics of Communication Common Carriers*. They provided U S WEST with a copy of that information during the review session. However, the total Switched Access Lines in that report is 818,368.[16] However, based on Attachment 3 to Dr. Mercer's testimony, the U S WEST count of Total Switched Access Lines is 831,980. We have not been able to resolve this discrepancy.

Q. PLEASE IDENTIFY THE FOURTH GUIDELINE SUGGESTED BY AT&T TO BE USED FOR DOCUMENTATION AND REVIEW OF COST STUDIES.

A. The fourth Guideline states:[17]

> "Any input expressed as a "dollars per minute", "dollars per foot", "dollars per loop", "dollars per port", and the like must be traceable back to the original source documents containing the number of dollars, minutes, feet, loops, ports, and the like . . . from which these figures were calculated."

Q. DID THE HATFIELD STUDY DOCUMENTATION INCLUDE A READILY AVAILABLE TRACEABLE SOURCE FOR ALL NUMBERS?

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[16] At the time of the meeting, it was indicated to U S WEST analysts that U S WEST was the only Local Exchange Company reporting for Utah. U S WEST has not yet verified that statement.

[17] Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-3.

A. No. U S WEST was unable to verify that the methodology that maps the density groups from the BCM part of the Model into the Hatfield Model density of population per square kilometer is sound. From our review, it appears that the output labels from one file with the BCM density parameters of lines per square mile become the input for another file with alternative headings of population per square kilometer. This appears to be a modeling logic error.

Q. DURING THE COURSE OF THE REVIEW, DID U S WEST IDENTIFY ANY OTHER CALCULATIONS OR ALGORITHMS THAT APPEAR SUSPECT?

A. Yes. In the calculation of annual capital costs, it appears that the Hatfield Model has systematically understated capital costs. The Hatfield Model calculates the capital costs using a cash flow analysis, that is "present worthed" and levelized. The Hatfield Model calculation labels indicate that it uses a discount rate to calculate the Net Present Value (NPV). In reality, however, it uses the composite Cost of Money (COM). Using the COM as a discount rate understates the capital costs.

Q. ARE THERE ANY OTHER HATFIELD LOGIC FLOWS THAT APPEAR INCONSISTENT WITH PRACTICAL MODELING THEORY?

A. Yes.

Q. PLEASE EXPLAIN.

A. U S WEST does not understand why HAI used one "super-factor" for depreciation[18] when it appears that the Model had the ability to perform the calculation on a "class-of-plant" basis with minimal additional work. The use of the "super-factor" is a modeling assumption that causes a severe distortion in results based on the change in inputs.

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18 Based on our review, HAI did not use either economic lives nor Commission prescribed depreciation rates.

This sensitivity to inputs was acknowledged by Hatfield in *The Cost of Basic Universal Service*,[19] when they stated,

> "We recognize that the depreciation assumption will be controversial. The results are sensitive to the depreciation assumption. The effect of using a composite average life of 15 years instead of 20 years would be to raise monthly cost in the 1,000-5000 density zone from $14.19 to $16.08 dollars per line -- an increase of 13 percent."

Hatfield expended considerable effort to identify operating expenses by class of plant using ARMIS data. However, they chose not to apply the same logic for capital related plant, even though capital costs represent a significantly larger percent of the total costs. Their efforts would have been better served by spending effort to model alternative depreciation input criteria by class of plant with appropriate survivor curve criteria.

Q. PLEASE IDENTIFY THE FIFTH GUIDELINE SUGGESTED BY AT&T TO BE USED FOR DOCUMENTATION AND REVIEW OF COST STUDIES.

A. The fifth Guideline states:[20]

> "To the extent practicable, data and workpapers must be provided in machine readable form on diskettes using standard spreadsheet or database software formats. Each diskette must contain a "read me" or similar file [sic s omitted] that defines the contents of each file on the diskette and contain an explanation of the definitions, formulas, equations, and data provided on the diskette. The extent that proprietary models are used, those proprietary models will be made available, along with documentation and user instructions, under protective order for use by Commission staff and other parties of standing."

Q. WAS U S WEST ABLE TO OBTAIN A COPY OF THE HATFIELD MODEL ON DISKETTE?

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19 Prepared for MCI Communications Corporation, By Hatfield Associates Inc., July, 1994, page 16.

20 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-3.

A. No. In response to U S WEST's request for a copy, Dr. Mercer, representing AT&T, gave the following response:

> "The BCM is a copyrighted product. Hatfield Associates is neither a developer nor owner of BCM. Requests for copies should be directed to the organizations who developed BCM and hold the copyright thereto; one of those organizations in U S WEST.
>
> "The Hatfield Cost Model is a program designed and developed by Hatfield Associates, Inc. (HAI). In order to protect the value and confidentiality of its property, HAI will not generally release copies of the Hatfield Model to outside parties. However, HAI recognizes that parties to this proceeding may have a need to inspect the model in order to understand its purpose and results. Therefore, HAI will make available for inspection a copy of the Hatfield Model pertaining to this proceeding under the following conditions: . . ."

As indicated previously, a limited number of U S WEST employees were able to view the Model on April 25, 1996. As part of this review, U S WEST was unable to identify if the algorithms or calculations incorporated from the BCM Modules had been modified in any manner.

Q. PLEASE IDENTIFY THE SIXTH GUIDELINE SUGGESTED BY AT&T TO BE USED FOR DOCUMENTATION AND REVIEW OF COST STUDIES.

A. The sixth Guideline states:[21]

> "An index or detailed table of contents of workpapers and source documents must be provided. In addition, to the extent practicable, a cross index should [be] included that will allow other parties to track key numbers through the various source documents, workpapers and exhibits."

Q. WAS AN INDEX OR DETAILED TABLE OF CONTENTS OF WORK PAPERS AND SOURCE DOCUMENTS INCLUDED AS PART OF THE STUDY DOCUMENTATION?

A. No. As stated previously, no documents describing the purpose and function of the Model exist; no documents describing the methods and

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[21] Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-3.

procedures used in the Model exist; and Dr. Mercer's testimony is the sole source for Model assumptions. I have discussed these issues related to source documents in detail related to other recommended Guidelines.

Q. DID THE REVIEW TEAM CRITIQUE THE HATFIELD MODEL METHODOLOGY IN LIGHT OF OTHER TSLRIC CRITERIA?

A. Yes. U S WEST reviewed the Model in the context of the *Principles for Preparing Cost Studies Based on Total Service Long Run Incremental Costs ("TSLRIC")* submitted by Ms. Parker of AT&T as Exhibit PAP-1 to her March 14, 1996 testimony. The results of that critique follow in subsequent questions.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 1.

A. Principle No. 1[22] states:

> **"Long run implies a period long enough that all costs are variable."**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No.

Q. PLEASE EXPLAIN WHY NOT.

A. The "Hatfield Model" has omitted costs that vary in the long run.

The Hatfield Model incorporated two modules of the Benchmark Cost Model (BCM) and the BCM omitted costs that should be included in a TSLRIC analysis.[23]

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[22] Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, first page.

[23] When U S WEST questioned Mr. Chandler on April 25, 1996 concerning whether items such as this had been "corrected" in the "Hatfield Model", he indicated that the BCM was incorporated intact except for the addition of drop and network interface investment.

The BCM Model developers omitted investment and expense related costs for drop wire, network interface devices[24], pedestals, serving area interfaces, terminal boxes, cross-connects in the field, and capitalized costs of splicing and engineering.

Further, by incorporating the BCM Model, the Hatfield Model excludes distribution plant in urban areas that varies in the long run. The BCM incorporates an engineering assumption of a constant four distribution legs per Census Block Group which is inappropriate for urban areas. In reality, a large urban subdivision will have a "branch" arrangement to assure that all housing units are included as part of the distribution area. The BCM has omitted costs based on the engineering design.

Further, by incorporating the BCM Model, the Hatfield Model has excluded some trench costs that vary in the long run. The BCM includes a factor that decreases trenching costs in proportion to the decrease in per foot material price of copper cable. In reality, the costs of trenching are not driven by the size of the cable, but rather driven by the distance required to trench no matter what size of cable is placed. The use of this factor as part of the Hatfield Model causes an omission of costs that vary in the long run.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 2.

A. Principle No. 2[25] states:

> **"Cost causation is a key concept in incremental costing."**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No. The Hatfield Model has at least three deficiencies in this area.

Q. PLEASE EXPLAIN THESE DEFICIENCIES.

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24 The Hatfield Model tried to adjust for drop and network interface deficiencies but violated Principle No. 3 in its application.

25 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, first page.

A. Cost causation is quite simple. If a service causes a cost, the cost should be included within the study. The Hatfield Model, through incorporation of the BCM, omitted costs for a service that are caused by the service. It omitted investment and expense related costs for drop wire, network interface devices[26], pedestals, serving area interfaces, terminal boxes, cross-connects in the field, and capitalized costs of splicing and engineering. It also omitted distribution plant costs in urban areas and some trenching costs. All these costs are caused by the addition of the service, so all should be included as part of the service cost study.

Second, Dr. Mercer[27] advocates exclusion of product specific costs such as marketing and product management. This is clearly counter to cost causality related to a service.

Third,[28] the Hatfield Model assumes, without representing a casual relationship, that the design and sizing associated with AT&T's interLATA toll service network is relevant for Utah's local exchange network. This implies that Utah's interoffice local network will consist of DS3 facility connections with fill in the 85% range.

The forward-looking interoffice interLATA network connects tandem switches to tandem switches and high-volume other locations. This assumption is totally inappropriate given the normal sizing requirements of connections between central office locations in Utah. Further, the modeling assumption of 85% fill significantly overstates existing average fill levels for AT&T's long distance competitors based on information within the same article[29]. Hatfield has not provided any justification that the investment levels associated with a DS3 driven network for interLATA

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26 The Hatfield Model tried to adjust for drop and network interface deficiencies but violated Principle No. 3 in its application.

27 Data request response 3.12 from U S WEST to AT&T.

28 Parts a and b of AT&T response to U S WEST request 3.7; Calculations based on material in *An Updated Study of AT&T's Competitors' Capacity to Absorb Rapid Demand Growth*, April 1995.

29 *An Updated Study of AT&T's Competitors' Capacity to Absorb Rapid Demand Growth*, page 20, Table 3-1, Competitors Required DS-3 Circuit Miles divided by Competitors Available DS-3 Circuit Miles. [3.8 divided by 7.4 equals 51%.]

toll can be causally related to an interoffice local network. This violates Principle No. 2.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 3.

A. Principle No. 3[30] states:

> **"The increment being studied should be the entire quantity of the service provided, not some small increase in demand.**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE IN ALL AREAS?

A. No. The Hatfield Model is deficient in at least two areas related to this Principle.

Q. PLEASE IDENTIFY THOSE AREAS.

First, the Hatfield Model relied upon inputs from the New Hampshire Telephone Incremental Cost Study for drops and switch maintenance expenses. The New Hampshire Telephone Company cost study is not a TSLRIC study, but rather an incremental (as a surrogate for marginal) cost study[31]. It, by definition, excludes some costs that should be included in a TSLRIC analysis. Use of incremental service incremental costs is a violation of H.B. 364, Section (13) which states:

> "Total service long run incremental cost" means the forward-looking incremental cost to a telecommunications corporation caused ***by providing the entire quantity*** of a public telecommunications service, network function, or group of public telecommunications services or network functions by using forward-looking technology, reasonably available, without assuming relocation of existing plant and equipment. The "long-run" means a period of time long enough so that cost estimates are based on the assumption that all inputs are variable. [emphasis added]

30 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, first page.

31 New Hampshire Incremental Cost Study, 4/30/93, page 3-4. It states, "The incremental cost of a service is the change in cost resulting from a change in the quantity demanded of that service."

Q. HOW SIGNIFICANT IS THIS UNDERSTATEMENT RESULTING FROM USING THE NEW ENGLAND STUDY?

A. Potentially, very significant. Further, based on statements within another incremental service study referenced by Dr. Mercer[32], the cost of the loop and network interface together are potentially understated by more than 67%[33] even based on an incremental rather than a total service view. Based on actual embedded data for Utah, the costs are understated even more significantly.[34]

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 4.

A. Principle No. 4[35] states:

> **"Any function necessary to produce a service must have an associated cost."**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No.

Q. PLEASE EXPLAIN HOW THE HATFIELD MODEL VIOLATES PRINCIPLE NO. 4.

A. The Hatfield Model has incorrectly omitted costs that are attributable to the service. The specific items omitted have already been discussed in relation to Principles 1, 2, and 3.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 5.

A. Principle No. 5[36] states:

> **"Common overhead costs are not part of a long run incremental cost study. Recovery of common overhead costs should be a pricing issue."**

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32 Beyond that, in his validation of loop investment identified in response to data request 3.18, Dr. Mercer has not compared "apples to apples". The Centel Telephone Study defines the "loop" component different than the Hatfield Model and so his $357 comparison is not appropriate.

33 ($117 in Centel Study/$70 in Hatfield Study)-1.

34 Testimony of DPU Staff Member, Mr. Larry Fuller in the last general rate case.

35 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, first page.

36 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, second page.

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. I don't know with the information available to me at this time. I can't tell if Dr. Mercer's terminology of "overhead loading" is designed as a direct cost of the service, direct cost of a service group, or an overhead.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 6.

A. Principle No. 6 states[37]:

> **Technology used in a long run study should be least-cost, most efficient technology that is currently available for purchase.**

Q. DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No.

Q. PLEASE EXPLAIN.

A. As discussed previously, the Hatfield Model assumes a design and sizing for the interexchange local network similar to the interLATA toll service network. This implies that Utah's interoffice local network will consist of DS3 facility connections with fill in the 85% range.

The forward-looking interoffice interLATA network connects tandem switches to tandem switches and high-volume alternative locations. This assumption is totally inappropriate given the normal sizing requirements of connections between central office locations in Utah. Further, the modeling assumption of 85% fill significantly overstates existing average fill levels for AT&T's long distance competitors based on information within the same article[38]. Hatfield has not provided any justification that the investment levels associated with a DS3 driven network for interLATA

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37 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, second page.

38 *An Updated Study of AT&T's Competitors' Capacity to Absorb Rapid Demand Growth,* page 20, Table 3-1, Competitors Required DS-3 Circuit Miles divided by Competitors Available DS-3 Circuit Miles. [3.8 divided by 7.4 equals 51%.]

toll can be causally nor related linked to an interoffice local network. This violates Principle No. 6 in addition to Principle No. 2.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 7.

A. Principle No. 7 states[39]:

> **Costs should be forward looking.**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No. The Hatfield Model violates this Principle in at least two ways.

Q. PLEASE EXPLAIN.

A. First, the study relied upon historical operating expense data derived from Federal Telecommunications Report 43-03[40] (ARMIS) tables for Utah with no adjustment for expected operating efficiencies and inflation impacts.

Second, the Hatfield Model relied upon depreciation rates that are not reflective of a competitive, forward-looking environment. The depreciation rates are significantly lower than U S WEST's economic rates, significantly lower than Commission prescribed rates, and certainly significantly lower than the depreciation rates used by other potential competitors[41] in this docket- including AT&T itself.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 8.

A. Principle No. 8[42] states:

> **"Cost studies, at a minimum, should be performed for the total output of specific services and preferably at**

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39 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, second page.

40 Response to data request 2-1, item 1. Please note that the data response indicates Report 43-04 but the Attachment A referenced was actually 43-03.

41 See data request response 1.14 from U S WEST to Phoenix Fiberlink in the earlier section of this docket. Phoenix Fiberlink uses a ten year financial and a 15 year tax life.

42 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, second page.

the level of basic network functions from which services are derived."

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No. The Hatfield Model assumed a significant number of inputs related to switching, tandem switching, SS7 and the loop that did not represent the totality of related networks. For example, Dr. Mercer did not address, at all the impacts of voice grade private line services which use the same loop and drop components as basic residence and business basic exchange service. Dr. Mercer's Model did not address the cost of the Dial Tone Line Service in Utah distinct from EAS in Utah. In fact, he didn't address interoffice toll service distinct from the usage component of basic exchange service.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 9.

A. Principle No. 9 states:

"The same long run incremental cost methodology should apply to all services, new and existing, regulated and non-regulated, competitive and non-competitive.

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. I do not have enough information to comment positively or negatively as the Hatfield Model addressed a limited number of services. I am concerned by AT&T's response to U S WEST's data request No. 3.12 concerning Dr. Mercer's belief that marketing and product management expenses need not be included for services for which universal funding may apply and for unbundled loops purchased by another entity. It appears that Dr. Mercer is advocating exclusion of relevant costs when his client is the potential "purchaser" or when his client may be subject to universal funding fees. To the extent a service causes costs, those costs should be included as part of the service.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 10.

A. Principle No. 10 states[43]:

> **"A TSLRIC study should use specifically determined forward looking least cost expenses.**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. No. The study relied upon historical operating expense data derived from Federal Telecommunications Report 43-03[44] (ARMIS) tables for Utah with no adjustment for expected operating efficiencies and inflation impacts.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 11.

A. Principle No. 11 states:

> **"Spare capacity is presumed to be service specific and volume sensitive unless demonstrated otherwise."**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

A. Based on the information and calculations available to us, we were unable to determine if spare capacity calculations are correct and so are unable to determine whether the Model complies with the Principle.

Q. PLEASE IDENTIFY AT&T COST PRINCIPLE NO. 12.

A. Principle No. 12 states:

> **"The study must express shared group costs in a lump sum for the group and identify the TSLRICs for all services in the group**

Q. BASED ON THE INFORMATION AVAILABLE TO YOU, DOES THE "HATFIELD MODEL" COMPLY WITH THAT PRINCIPLE?

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43 Direct testimony of Patricia A. Parker, March 14, 1996, Exhibit PAP-1, third page.

44 Response to data request 2-1, item 1. Please note that the data response indicates Report 43-04 but the Attachment A referenced was actually 43-03.

A. If my understanding of the intent of the overhead loading factor within the Hatfield Model is correct, this is inconsistent with AT&T's proposed advocacy of the Principle. It appears that Dr. Mercer has unitized the shared administrative costs across the relevant services which is certainly counter to Ms. Parker's advocacy both within and external to this case. However, unitizing this cost is not problematic from a methodology standpoint for U S WEST though we certainly dispute how Dr. Mercer arrived at the 6%.

First, we were unable to track how Dr. Mercer arrived at the 6%. Beyond that, we haven't determined his rationale for suggesting that an automobile manufacturing industry is likely to have the same cost structure as U S WEST given that 71% of their costs are variable manufacturing costs and roughly 52% of the costs calculated by Dr. Mercer on Attachment 3 are capital related costs. It would appear to me that telecommunications is far more capital intensive than automobile manufacturing.

IV. CALCULATION OF "AVOIDED" COSTS FOR RESOLD SERVICES

Q. ARE THERE CONTINUING ISSUES WITH RESPECT TO RESALE?

A. Yes. Competitive Local Exchange Carriers ("CLEC") continue to raise two primary issues. First, CLECs continue to allege that they cannot be a viable competitor unless they acquire resellable U S WEST services at wholesale prices substantially smaller (discounted) than today's retail counterparts.

Second, the CLECs continue to allege that they understand how to calculate such discounted wholesale prices of resellable services, which should be absent costs that will be avoided.[45]

Attempting to drive the methodology of calculating wholesale prices for LECs, several CLECs have proposed their own "cost" models in their direct testimony. The calculations of these proposed cost models allegedly identify the "right" discount method and rate, and the "right" costs to exclude from U S WEST's studies. In this round of testimony, AT&T proposes yet another model. This time it is sponsored by Mr. James P. Monighetti.[46]

Q. DO YOU AGREE WITH ANY OF THE COST MODELS PROPOSED BY CLECS?

A. No. My rebuttal testimony and that of Mr. Jeffrey D. Owens discusses why the cost models, discount methods and rates proposed by the CLECs are outrageous and flawed.[47] Furthermore, and judging from the number of proposals made, there is apparent chaos even among CLECs who rush to identify the "right" discount rate. Mr. Monighetti's proposal just adds more confusion to this mass, by submitting an even bigger wholesale discount rate he calculated using an alleged ". . . better surrogate method . . ."

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45 Dr. Howard Bell, Rebuttal Testimony, April 18, 1996, page 7 - 9.

46 The direct testimony of Dr. Howard Bell on behalf of AT&T and Mr. J. Scott Bonney of Nextlink and Mr. Jerry E. Dyer of Tel-America, and the rebuttal testimony of Mr. James P. Monighetti of AT&T contain proposed discount method calculations and rates.

47 G. G. Santos-Rach, Rebuttal, April 19, 1996, pages 4 - 12; Jeffrey D. Owens, Rebuttal, April 19, 1996, pages 27 - 50.

Q. WHAT'S DIFFERENT ABOUT MR. MONIGHETTI'S PROPOSED "AT&T RETAIL AVOIDED COST MODEL" COMPARED TO DR. BELL'S DIRECT TESTIMONY PROPOSAL?

A. Nothing apparently. Mr. Monighetti misapplies economic principles and uses inappropriate input data to yield a bigger discount rate of 44.4% for total local service.[48] Mr. Monighetti even proposes to "avoid" costs that Dr. Mercer did not even include within his proposed calculations of basic exchange costs. This rate further exacerbates the flawed, outrageous discount rate of 35% originally proposed by Dr. Bell.

Q. HOW DOES MR. MONIGHETTI MISAPPLY ECONOMIC PRINCIPLES AND MISUSE INAPPROPRIATE INPUT DATA?

A. I believe that Mr. Monighetti has inappropriately adopted the ETI cost study methodology, as Dr. Bell did in his direct testimony, and has misapplied U S WEST's Utah-specific ARMIS data meant for other uses. In other words, Mr. Monighetti's model is apparently the same misapplication as Dr. Bell's, as explained by Mr. Jeffrey D. Owens. Mr. Monighetti and Dr. Bell, however, now attempt to disguise this new model as "a better surrogate."[49]

Q. BEFORE TURNING TO THE DETAILS WHERE MR. MONIGHETTI HAS ERRED, DOES THE METHODOLOGY PROPOSED BY MR. MONIGHETTI COMPLY WITH THE TELECOMMUNICATIONS ACT OF 1996?

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48 James P. Monighetti, Rebuttal, April 18, 1996, page 7

49 Ibid.

A. No.

Q. PLEASE EXPLAIN THE DIRECTION GIVEN IN THE TELECOMMUNICATIONS ACT OF 1996.

A. The Act gives direction as follows[50]:

> "(3) WHOLESALE PRICES FOR TELECOMMUNICATIONS SERVICES.-- For the purposes of section 251(c)(4), a State commission shall determine wholesale rates on the basis of retail rates charged to subscribers ***for the telecommunications service*** requested, excluding the portion thereof attributable to any marketing, billing, collection, and other costs that will be avoided by the local exchange carrier. [emphasis added].

Q. PLEASE EXPLAIN HOW MR. MONIGHETTI'S PROPOSAL DOES NOT COMPORT WITH THE ACT.

A. Mr. Monighetti continues to espouse an AT&T philosophy that "group costs" and "common costs" and "costs of other services" will "go-away" for a particular service. These costs can't be avoided if they weren't part of the service cost initially. The Act succinctly indicates that the determination of costs that will be avoided is related to a retail telecommunications ***service*** provided to subscribers who are not telecommunications carriers. AT&T describes their "Model"[51] as follows:

> "The AT&T model does not develop the cost of a specific service. Instead the model identifies and eliminates the LEC retailing costs associated with business units or product lines that a wholesale purchaser such as AT&T would not expect to pay."

On it's face, and by AT&T's own description, these Models do not comply with the Telecommunications Act of 1996.

Q. ARE THERE SPECIFIC ASSUMPTIONS OF MR. MONIGHETTI'S COST MODEL THAT ARE INCORRECT?

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50 Telecommunications Act of 1996, Section 252 (d) (3).

51 AT&T response to U S WEST data request 1.1.

A. Yes. Referring to his Exhibit JPM-1 and JPM-2, Mr. Monighetti's portrayal of costs that will be avoided is flawed as was Dr. Bell's direct testimony. At best, like Dr. Bell's list, Mr. Monighetti's list is simply a very rough starting point for general categories of expenses that need to be reviewed to determine if any specific expenses will change based on resale. Mr. Monighetti's list is not supported by any functional process analysis or detailed quantitative analysis. Further, Mr. Monighetti seems to infer that all costs in these broad general categories will be avoided rather than recognizing that the costs associated with marketing, billing and collection may change, but the function and the entire set of costs will not be avoided in most instances. Further, Mr. Monighetti seems to infer that the "avoided cost" will always result in a reduction to the retail rate rather than recognizing that in some expense categories, the cost of selling the service to a reseller may result in larger costs to the base provider.

Q. REFERRING TO MR. MONIGHETTI'S EXHIBIT JPM-2, EXPLAIN HOW "UNCOLLECTIBLES" IS MISREPRESENTED AS A COST THAT WILL BE AVOIDED.

A. First, Mr. Monighetti alleges that "Uncollectibles" is 100% avoidable to AT&T. Said another way, Mr. Monighetti implies U S WEST will always collect all its receivables on time from AT&T. While this may be AT&T's intent today, it does not represent any guarantee tomorrow. Further, AT&T certainly will not be the only company to resell services. We need only look at the airline industry for examples of well-intentioned and experienced companies who experienced financial problems after deregulation in the airline industry. The names range from PAN AM to

Continental to Braniff to Mark Air to Frontier. There is no reason to believe that in the telecommunications industry every new entrant or existing incumbent will succeed. That simply is not the way the marketplace works. The size of uncollectibles is really the issue, and it is still a real cost to U S WEST.

Q. IS THERE A CHANCE THAT U S WEST'S "UNCOLLECTIBLE" EXPENSE MAY BE BIGGER THAN TODAY?

A. Yes. For example, CLEC A wins over 10,000 U S WEST local exchange customers, all of who stay physically connected to U S WEST's resold wholesale service, and that this CLEC then goes out of business. It is possible that U S WEST would have to declare 100% receivable revenues from CLEC A as "uncollectible," as opposed to just a smaller percentage declared presently. In this situation the customers may already have paid the CLEC A, but CLEC A has not paid U S WEST. In this scenario, U S WEST's uncollectible expense category would be higher, because of resale, than if those same 10,000 customers remained U S WEST customers.

Q. REFERRING TO THE SAME EXHIBIT JPM-2 OF MR. MONIGHETTI, ARE THERE OTHER COSTS MISREPRESENTED AS AVOIDABLE COSTS?

A. Yes, Mr. Monighetti misrepresents several costs as avoidable costs. The general categories are:

- Product Management
- General Support

- Operator Service and Call Completion
- Directory Assistance
- Testing and Plant Administration
- Billing and Collections
- General Administrative Expenses
- Other Interest Deduction
- Income Taxes
- Return

Q. PLEASE EXPLAIN HOW "PRODUCT MANAGEMENT" EXPENSES ARE MISREPRESENTED BY MR. MONIGHETTI AS AVOIDABLE COSTS.

A. All product management expense will not be avoided for resold services. U S WEST still needs to employ product managers for two primary reasons. First, these product managers will continue to research and develop new products and improve existing resold products. To the extent U S WEST is successful, CLECs like AT&T (who divested their research and development arm) stand to eventually profit from reselling these products.

Second, these same product managers are responsible for setting wholesale prices for existing products made available for resale to AT&T and other potential resellers in the first place. U S WEST, as a company who must continue to incur product management expenses to package and price services that the resellers will be able to purchase.

Q. PLEASE EXPLAIN HOW "GENERAL SUPPORT" EXPENSES ARE MISREPRESENTED BY MR. MONIGHETTI AS AVOIDABLE COSTS.

A. As in the last question and answer, general support expenses will not be avoided, because U S WEST incurs these in support of the same activities noted. To the extent that these costs are not currently included as part of a service study, they are irrelevant to identifying costs that "will be avoided" in relation to a particular service offering.

Q. PLEASE EXPLAIN HOW "OPERATOR SERVICE AND CALL COMPLETION" EXPENSES ARE MISREPRESENTED BY MR. MONIGHETTI AS AVOIDABLE COSTS.

A. Some of these expenses could be avoided, simply because most are costs assessed related to end user services. However, they are potentially avoidable only in the context of those end-user operator services. Said another way, few of these costs are part of other services.

However, even if a reseller like AT&T were to employ their own operator services, comprehensive equipment and methods and procedures may not be in AT&T or U S WEST's network to stop the inward flow of calls to U S WEST's operator services.

The reality is that U S WEST will still have to entertain "miscellaneous" and other calls misdirected to U S WEST operators by CLEC customers. For example, U S WEST will continue to get requests like "what time is it," misdirected directory assistance requests intended for the reseller, misdirected requests for prices of CLEC services and so on.